### BUILDING, PERMITTING & INSPECTIONS

## FAUQUIER COUNTY NEWSLETTER DEPARTMENT OF COMMUNITY DEVELOPMENT

29 Ashby Street Warrenton, Virginia 20186 540-347-8648 Fax 540-347-2043

1<sup>st</sup> Edition January 2007

#### Does Your Backyard Shed Need a Building Permit?

**Code Connection** 

The 2003 Uniform Statewide Building Code (USBC) and the International Residential Code (IRC) define an "Accessory Structure" for a one & two family dwelling as "a building, the use of which is incidental to that of the main building and which is located on the same lot". The prefabricated tool sheds or storage buildings that many homeowners have delivered are considered accessory structures under the USBC and would be covered by the IRC.

Accessory structures require building permits unless they meet the requirements for the exemption in the USBC, Section 108.2. This section exempts from the requirement for a building permit any accessory structure used as a tool or storage shed, playhouse or similar use provided the floor area of the accessory structure does not exceed 150 square feet. A zoning permit is still required.

A building permit for an accessory structure must be applied for in accordance with Sections 108.3 & 108.4 of the USBC. A complete structural plan is required to be submitted, with the permit, noting the location of the building on the property, the structural design, the bearing points, the size of the footing, foundation type, anchorage system and the layout of the pre-manufactured structure as well as the 'built on site structure'. All normal inspections will be required for these structures, footings, framing and final, after the project is completed.

The USBC also added an additional provision addressing the footings and foundations for accessory buildings to section R403.1 of the IRC.

**Shed** continue on the back

## What are the Minimum Inspections Required?

Many people ask the question when and what building inspections are needed? The required inspections are noted below but not limited to: *Erosion Control* (E&S): Land disturbance before construction is performed.

Footings: Prior to the placement of concrete. Backfill: After waterproofing, drainage system is installed, the upper floor is installed & prior to the placement of backfill.

Concrete Poured Walls: Forms and steel set and prior to placement of concrete.

Plumbing Groundwork: After pipe is installed, supported and with appropriate approved tests.

Concrete Slabs: Groundwork's approved, backfill, gravel and vapor barrier is installed.

Electrical Rough-in: All wires are installed and supported and stapled, the grounding and neutral are tied together.

Plumbing Rough-in: All water and drain waste and vent lines are installed, supported and with a proper test.

*Mechanical Rough-in*: Duct work installed, proper support, masked and taped in all areas prior to concealment.

Framing Rough-in: When all rough-in items are completed, all structural and framing items have been completed.

*Insulation:* Insulation in place, caulked sealed and after all rough-ins are completed

*Electrical Service*: Meter, service equipment & conductors are set, grounding and bonding installed, GFCI receptacle in place.

**Inspections** continue on the back

#### FIRE IN THE NEWS

Good news reported in the "Fire Loss in the United States During 2005", written by Michael J Karter Jr. Below are a few of the statistics for 2005 that can be found in the report:

The NFPA estimates that approximately 1.6 million fires occurred in the United States.

Of these fires, approximately 511,000 were structure fires. This is a decrease of roughly 2.9 % in the number of structure fires when compared to 2004.

Structure fires accounted for 31.9 % of all fires occurring in the United States.

Approximately 77.5 % of the structure fires occurred in residential occupancies.

An estimated 31,500 structure fires were intentionally set fires.

3,675 civilian fire fatalities are estimated to have occurred in the United States.

Fires in one and two-family dwellings caused 69.9 % of all civilian fire fatalities

Fires in all residential occupancies (this includes dwellings, hotels, dormitories, boarding houses and similar occupancies) were responsible for a total of 83.1 % of all civilian fire fatalities.

Fires in commercial (non-residential) buildings caused an estimated 50 civilian fire fatalities. This is 1.36 % of all civilian fire fatalities that occurred.

An estimate 315 civilian fire fatalities were caused by intentionally set fires.

Overall, the total of civilian fire fatalities occurring in residential occupancies in the United States in 2005 decreased by 5.3 % when compared to 2004, while the total number of civilian fire fatalities that occurred decreased by 5.8%.

The NFPA report also contains the following statistics, which help to put the statistics cited above in context:

- -The NFPA estimates that 1.098 million structure fires occurred in 1977. The number of structure fires occurred in 2005 has decreased by 53.4 % when compared to 1977.
- -The number of civilian fire fatalities that occurred in one and two-family dwellings is estimated to have peaked at 6,015 fatalities in 1978. In 2005 fatalities declined 49.6% when compared to 1978. \*

### Watch Your Cooking

#### **Code Connection**

Cooking is the leading cause of home fires and injuries. Cooking equipment is involved in more reported home fires each year and most of those involve the kitchen stovetop. Most cooking fires occur because people leave their appliances unattended while cooking. Here are a few reminders that will help to prevent fires and the resulting injuries and deaths that may be caused from cooking.

Pay attention to your cooking. Stay in the kitchen when you are frying, grilling, broiling or boiling food.

If you must leave the room, even for a short period of time, turn off the stove.

When you are simmering, baking, or roasting food, check it regularly, stay at home and use a timer to remind you.

Keep pan handles from hanging over the front of the stove.

If you have young children, use the stove's back burners whenever possible.

Keep children and pets at least three feet away from the stove.

When you cook, wear clothing with tight-fitting sleeves.

Allow food cooked in a microwave oven to cool for a minute before you remove it from the oven, and use an oven mitt.

Ensure all appliances are in good working order. Have gas appliances serviced regularly and replace cracked or frayed electrical cords.

Have ground fault circuit interrupters installed in the kitchen, especially for counter tops and near sinks.

When finished cooking, turn burners or ovens "off" before leaving the stove.

When grilling on the deck or porch, stay with it. "Flame-ups" can happen in a second.

Always remember to keep your smoke detectors in working order. \*

# Four Seasons of Conditioning Your Home

Air handling equipment running? Are You still <u>uncomfortable</u>?

Just maybe one or more of the following could cause a loss of efficiency and unwanted wear of your air handling equipment.

Improper refrigerant charge or type
Failure to meet minimum air flow
Air leakage in the duct system that is not
properly sealed and taped at the joints
reduce the efficiency of the unit and
could produce leakage and condensation due to poor insulation on the
ducts

The lack of system maintenance and cleaning or changing duct filters
Check insulation R-Values in your attic and floors. The prescriptive insulation requirements of the Model Energy Code for Fauquier County are:

R-5 duct work located within the building but outside of conditioned space

R-8 ductwork located outside of the building

R-38 in Ceiling

R-16 in Sidewalls

R-19 in Floors

R-9 in Basements Walls

These requirements are for the 2003 IRC Codes and may not be what was required when your home was built. Contact your insulation contractor to see if your home is properly insulated and your mechanical contractor to perform an air flow test to identify the locations of any air losses.

Remember, an energy efficient home keeps everyone happy. \*

#### **From The Hot Seat**

David J. Cooper - Building Official

I would like to welcome you to the first edition of our quarterly news letter. The Building Department is going to publish a short news letter that will try and update the community concerning a wide variety of issues associated with construction and code compliance.

During the coming year the Building Department will attempt to provide information about many issues that should be of interest to building contractors as well as the general public. We will try to highlight the trouble spots that we see daily as well as problem solving insight into code related topics. Providing information concerning issues that we see daily as problem areas will help keep contractors and the general public aware of potential pitfalls and hopefully keep them from making such errors.

Lack of information frequently limits our abilities to perform tasks efficiently and in a timely manner. We will try and supply informational resources that will help resolve problems that are encountered when attempting to construct or remodel our homes and businesses. My hope is to provide the community with additional resources for those seeking guidance with permitting, construction and inspection of their building projects.

Please read and comment on our new publication. This will allow us to tailor our efforts to supply the information that you are most interested in. I welcome your insight and suggestions. Our goal is to promote a better working relationship between the Building Department and our community. It is important that we work together in order to achieve high quality cost effective construction in Fauquier County.

If the tool shed or storage building is:

- 150 sq. ft. to 256 sq. ft in area
- not more than 12 feet in height
- not more than 18 inches from finished floor level to grade
- is anchored to resist wind loads;
- is wood or light steel frame construction
- is supported by structural elements on firm soil according to the provisions of the exception;

then it would not be required to have a continuous footing and foundation or other approved foundation system.

When accessory structures are larger than 256 sq ft in area, the structure is required to have the usual continuous footings and foundations or designed foundation; with frost depth below finished grade and on bearing soil, etc.

Another common question is whether pre-fabricated accessory structures are required to have Virginia Registration Seals as registered industrialized buildings under the Industrialized Building Safety Regulations (IBSR)

The IBSR provides a system for inspection of any of the components of the construction which will be concealed before transport to the point of use. The system allows for the verification of code compliance of those hidden components for local building officials unable to inspect the construction in the factories off-site.

Most pre-fabricated sheds are unfinished on the interior, leaving the structure open for inspection by the building official upon delivery to the dwelling site. Without concealed components in these 'opened wall buildings', inspections can be done on-site; meaning there is no need to go thru the IBSR process to build them as registered industrialized buildings.

However some pre-fabricated sheds are being constructed with finished interiors and electrical systems already installed. Manufacturers of these 'closed wall buildings' may go through the procedures to build 'registered' industrialized buildings, meaning the buildings have been certified under the IBSR and bear Virginia Registration Seals.

Or, manufacturers and builders may construct 'unregistered' industrialized buildings that have not been certified under the IBSR and do not bear Virginia Registration Seals. Such buildings present unique circumstances which must be evaluated by the Building Official or a case-by-case basis.

**Inspection** continued from the front

Gas Lines: Inside lines are set, shut off valves, pipe is supported, with appropriate test. Tank and Line: Tank is set with partial backfill,

gas line in opened ditch, test on line.

Water and Sewer Laterals: Piping installed on approved bedding at proper depths and prior to backfilling with appropriate test

Final Inspection: Inspections are made after the structure is complete and ready for use to include electrical, mechanical, plumbing systems being operational and after grading is complete and soil stabilized.

Certificate of Occupancy: Before a Certificate of Occupancy can be issued for a new dwelling, the final inspection needs to be approved. The Health Department Operation

Permit or W.S.A. or Town of Warrenton Occupancy Permit Release Forms are submitted to the Building Department and a site plan may also be required. \*

#### CONTACT NUMBERS

 Building Inspections or
 540-347-8646

 Plan Review
 540-347-8647

 Fax
 540-347-2043

 Zoning Department
 540-347-8789

 Soil Scientist
 540-341-3374

 Fire Marshal
 540-347-6995

 Highway Department
 540-347-6441

 Health Department
 540-347-6363

 Dig Smart
 1-888-258-0808

 Miss Utility
 1-800-552-7001

 Permitting & Inspection questions e-mail:

Jennifer.Sexton@fauquiercounty.gov REFERENCES TO OTHER SITES:

> www.fauquiercounty.gov www.vbcoa.org www.dhcd.virginia.gov www.iccsafe.org www.energycodes.gov/recheck

www.vpmia.org

www.osha.org

Office Hours 8:00 – 4:30 Monday-Friday